

EXHIBIT E

REQUIRED PERMITS AND APPLICABLE SUBSTANTIVE PROVISIONS

Under RCW 70.105D.090, remedial actions conducted pursuant to an Agreed Order are exempt from the procedural requirements of Ch. 70.94 RCW, the Washington Clean Air Act, Ch. 70.95 RCW, the Solid Waste Management, Reduction and Recycling Act, Ch. 70.105 RCW, Hazardous Waste Management Act, Ch. 75.20 RCW (now 77.55), Construction Projects in State Waters Act, Ch. 90.48 RCW, Water Pollution Control Act, and Ch. 90.58 RCW, Shoreline Management Act, and the procedural requirements of any laws requiring or authorizing local government permits or approvals for the remedial action.

This order requires a group of remedial actions be taken at the site. They include:

- Excavation and removal of buried drums, transporting and off-site disposal of the drums and their contents, evaluation of the soils underlying the drum disposal area, and potentially, additional remedial activities, like soil venting;
- Extraction, treatment and disposal of contaminated water from “the Hole”;
- Undertaking a remedial investigation of the nature and extent of contamination at the site and developing a feasibility study of possible additional remedial actions;
- Construction of a landfill cover system and construction and operation of a landfill gas collection and treatment system.

This Agreed Order does not include any remedial actions for which permits or approvals would be required under either Ch. 77.55 RCW, Construction Projects in State Waters or Ch. 90.58 RCW, Shoreline Management Act, so they will not be considered in this exhibit. If the parties agree upon other remedial actions to be undertaken at the site, they will be evaluated to ascertain whether these statutes are triggered.

Each of the remedial actions is described in the following tables. Potentially applicable statutes and regulations are listed together with the substantive requirements that apply to each remedial action.

I. Excavate and Remove Drums

Project description:

Approximately 2,000 buried steel “55 gallon” drums will be removed from the Ephrata Landfill. The project will begin by “potholing” the area to determine the boundaries of the drum area and the elevation of the top of the drums. Next, the overburden will be removed without driving heavy equipment over the drums or otherwise damaging them. The excavated overburden will be stored in covered stockpiles and returned to the void after the drums are removed.

Overburden and surrounding materials will be removed as necessary to provide a safe access to the drums. All refuse exposed by the excavation will be covered with either at least six inches of soil or an approved temporary membrane.

The drums are anticipated to contain solidified paint sludges, inorganics, and organic solvents from manufacturing sources. The drums and their contents, as well as any debris resulting from disintegration of the drums and their contents, may designate as dangerous waste or extremely hazardous waste. In addition, the soils between and beneath the drums may be contaminated. These materials will be sampled and the samples analyzed to determine whether they designate as dangerous waste and to characterize and profile the material for transport and disposal.

Table 1. Procedural and Substantive Requirements of Statutes, Regulations and Local Ordinances Applicable to Excavation and Removal of Drums

STATE OR LOCAL LAW	PROCEDURAL REQUIREMENTS	SUBSTANTIVE REQUIREMENTS
Local Ordinances and Rules		
	Grading Permit – waived by statute	
State Statutes and Regulations		
Ch. 70.94 RCW – Clean Air Act		
Ch. 173-400 WAC – General Regulations for Air Pollution Sources	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Apply best available control technology (BACT) to emissions from drum burial area and comply with ambient air quality standards.
Ch. 173-460 WAC – Controls for New Sources of Toxic Air Pollutants	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Apply best available control technology for toxics (T-BACT) to emissions from drum burial area and control ambient air quality impacts.

Ch. 70.95 RCW – Solid Waste Management		
Ch. 173-350 WAC – Solid Waste Handling Standards	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Storage and handling of refuse and other solid wastes (not regulated under Chs 173-303 and 173-351 WAC) are subject to the requirements of Ch. 173-350 WAC. Applicable requirements for planned activities under Ch. 173-350 WAC may include, but are not limited to: WAC 173-350-320 – Piles used for storage or treatment.
Ch. 173-351 WAC – Criteria for Municipal Solid Waste Landfills	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Landfilling of municipal solid waste (not regulated under Ch. 173-303 WAC) is subject to the requirements of Ch. 173-351 WAC. All refuse and other solid wastes excavated as part of the planned activities must be placed in the permitted municipal solid waste landfill unit or otherwise meet the substantive requirements of Ch. 173-351 WAC. Grant County must continue compliance with the solid waste handling permit issued by Grant County Health District except for actions directly addressed in this Agreed Order. See WAC 173-351-460 and WAC 173-350-900(1).
Ch. 70.105 RCW – Hazardous Waste Management Act		
Ch. 173-303 WAC – Dangerous Waste Regulations	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	<p>The drums and their contents, as well as any debris resulting from disintegration of the drums and their contents, will be subject to the designation requirements of the Dangerous Waste Regulations, Ch. 173-303 WAC, when removed from the burial location.</p> <p>The County will become a generator of hazardous waste when the drums are excavated,</p>

		<p>and will be required to meet the generator requirements of WAC 173-303-170, including, but not limited to: designating wastes, assigning an EPA ID number, meeting waste accumulation standards, preparing wastes for transport, land disposal restrictions, manifests, recordkeeping, and reporting.</p> <p>Some methods of storage, on-site treatment, or handling would add additional requirements. WAC 173-303.</p> <p>Persons transporting dangerous waste drums and debris are subject to the transporter requirements of WAC 173-303-240.</p>
Ch. 46.48 RCW – Transportation of Hazardous Materials		
Adopts 49 CFR Part 172 Hazardous Materials Table, Special Provisions, Hazardous Materials Communications, Emergency Response Information, And Training Requirements.	No permits or procedural requirements in this law.	Requirements include marking of packages, shipping papers, placarding, emergency response, training, and planning.

II. Extract Groundwater from the Hole with Treatment or Disposal

Project Description:

The Hole is a subsurface depression in the basalt beneath the old landfill located in the northwest corner of the old landfill. It is 10 to 20 feet deep and about 450 feet in diameter. The bottom of the depression is filled with a sediment-refuse mix. The bottom 7-10 feet of the soils and refuse in the Hole is saturated with water. The water will be pumped out of the Hole through well EW-1. This well is in place, so no additional drilling will be required through refuse.

The anticipated rate of pumping from EW-1 is approximately 1-2 gallons per minute. At that rate, the volume of water produced daily will be approximately 1,400 gallons. The water will be pumped into a trailer-mounted storage container. The proposed treatment of this water is either evaporation from an on-site pond or limited pre-treatment with discharge to the Ephrata sewage treatment plant.

Table 2. Procedural and Substantive Requirements of Statutes, Regulations and Local Ordinances Applicable to Extraction of Groundwater from the Hole with Treatment or Disposal

STATE OR LOCAL LAW	PROCEDURAL REQUIREMENTS	SUBSTANTIVE REQUIREMENTS
Local Ordinances and Rules		
	Grading Permit – waived by statute	
	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	
State Statutes and Regulations		
Ch. 70.94 RCW – Clean Air Act		
Ch. 173-400 WAC – General Regulations for Air Pollution Sources	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Apply best available control technology (BACT) to emissions and potential emissions from project and comply with ambient air quality standards.
Ch. 173-460 WAC – Controls for New Sources of Toxic Air Pollutants	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Apply best available control technology for toxics (T-BACT) to emissions and potential emissions from project and control ambient air quality

		impacts. Evaluation of possible emissions from pond. Impacts from evaporation or other treatment of water from the Hole must be evaluated.
Ch. 70.95 RCW – Solid Waste Management		
Ch. 173-350 WAC – Solid Waste Handling Standards	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	<p>On-site storage and handling of leachate (not regulated under Ch. 173-303 WAC) is subject to the requirements of Ch. 173-350 WAC.</p> <p>Construction of a new surface impoundment or use of a storage tank must conform to the substantive requirements of WAC 173-350-330. Grant County must continue compliance with the solid waste handling permit issued by Grant County Health District for the facility except for activities directly addressed in the Agreed Order. See WAC 173-350-900(1).</p>
Ch. 70.105 RCW – Hazardous Waste Management Act		
Ch. 173-303 WAC – Dangerous Waste Regulations	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Based on previous sampling, no applicable requirements are anticipated. Water pumped from the Hole will need characterization. Generator requirements will apply if water designates as dangerous waste. Treatment of water would add additional requirements.
Ch. 90.48 RCW – Water Pollution Control		
Ch. 173-216 WAC – State Waste Discharge Program	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Any discharge of water of extracted from the Hole to the Ephrata treatment plant must meet pre-treatment requirements.
Ch. 173-200 WAC – Ground Water Quality Standards for the State of Washington	NA	Ch. 173-200 WAC does not apply to clean up actions approved by the Department of Ecology under the Model Toxics

		Control Act, Ch. 70.105D RCW, see WAC 173-200-010(3)(c).
Ch. 18.104 RCW – Water Well Construction		
Chapter 173-160 WAC – Minimum Standards for Construction and Maintenance of Wells	Remedial actions conducted pursuant to an Agreed Order are not exempt from Ch. 18.104 RCW procedural requirements.	No additional wells are planned to be constructed for this interim action. Ecology must be notified of the intent to begin well reconstruction-alteration, or decommissioning procedures at least seventy-two hours before starting work.

III. Remedial Investigation and Feasibility Study

Project Description:

PLPs will conduct a remedial investigation (RI) to determine the nature and extent of contamination at the site and a feasibility study (FS) to identify and evaluate possible additional remedial actions to address the contamination. Existing information about site conditions informs the scope and nature of additional investigation at the site.

There are several specific tasks included in the RI. The extent of contamination released from the buried drums described above will be investigated. Second, test pits will be dug in the northern part of the landfill to identify additional sources of contamination in that area of the landfill. Next, the extent of groundwater contamination will be delineated. Wells will be installed and sampled in three aquifers, the Interflow, the Roza and the Frenchman Springs Aquifers. Data from the new wells and existing wells at the site will be analyzed. Data gaps will be identified and additional work performed, if necessary. The data will also be used to formulate remedial alternatives to be evaluated in the FS.

Table 3. Procedural and Substantive Requirements of Statutes, Regulations and Local Ordinances Applicable to the Remedial Investigation and Feasibility Study

STATE OR LOCAL LAW	PROCEDURAL REQUIREMENTS	SUBSTANTIVE REQUIREMENTS
Local Ordinances and Rules		
State Statutes and Regulations		
Ch. 70.95 RCW – Solid Waste Management		
Ch. 173-351 WAC – Criteria for Municipal Solid Waste Landfills	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Comply with groundwater monitoring requirements – detection monitoring WAC 173-351-430; assessment monitoring and corrective action requirements, WAC 173-351-400 as applicable. Grant County must continue compliance with the solid waste handling permit issued by Grant County Health District for the facility except for activities directly addressed in the Agreed Order. See WAC 173-351-460. Environmental monitoring requires conformance with

		<p>approved plan of operation.</p> <p>Local health department may participate in negotiations and review and comment upon any reports submitted to Ecology. WAC 173-351-460. Ecology shall perform as described in Ch. 70.105D RCW and Ch. 173-340 WAC, WAC 173-351-465.</p>
Ch. 70.105 RCW – Hazardous Waste Management Act		
Ch. 173-303 WAC – Dangerous Waste Regulations	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Wastes excavated from test pits may designate as dangerous waste. Wastes from investigative activities must be characterized for handling and disposal as required by Ch. 173-303 WAC.
Ch. 18.104 RCW – Water Well Construction		
Ch. 173-160 WAC – Minimum Standards for Construction and Maintenance of Wells	Remedial actions conducted pursuant to an Agreed Order are not exempt from Ch. 18.104 RCW procedural requirements.	Ecology must be notified of the intent to begin well construction, reconstruction-alteration, or decommissioning procedures at least seventy-two hours before starting work. Wells must be constructed in conformance with all requirements.
Ch. 173-162 WAC – Regulation and Licensing of Well Contractors and Operators	Remedial actions conducted pursuant to an Agreed Order are not exempt from Ch. 18.104 RCW procedural requirements.	A resource protection well operator's license is required for construction or decommissioning resource protection wells and for geotechnical soil borings.

IV. Construct Closure System and Post-Closure Monitoring for Old Landfill

Project Description:

A cap system that meets the criteria of Ch. 173-351 WAC for non-arid area landfills will be constructed over the landfill. In addition, a passive landfill gas control system will be completed at the site. Vertical gas extraction wells were installed in 2005. A flare with solar-powered continuous igniter will be constructed. Finally, a surface water management system designed to divert water away from the landfill will be designed and constructed. A closure plan and preliminary final cover design documents have been submitted to the jurisdictional health department.

Table 4. Procedural and Substantive Requirements of Statutes, Regulations and Local Ordinances Applicable to Constructing the Closure System and Post-Closure Monitoring of the Old Landfill

STATE OR LOCAL LAW	PROCEDURAL REQUIREMENTS	SUBSTANTIVE REQUIREMENTS
Local Ordinances and Rules		
State Statutes and Regulations		
Ch. 70.94 RCW – Clean Air Act		
Ch. 173-400 WAC – General Regulations for Air Pollution Sources	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Installation of the closure system triggers new source review, application of best available control technology (BACT) and compliance with ambient air quality standards. Ecology is the air authority for this project. Ecology issued a letter that confirms that a Title V air operating permit will not be required for the site so long as the combined existing landfill and expansion area landfill capacity is under 2.5 megagrams (the 40 CFR 60 Subpart WWW threshold.) The Notice of Construction for the landfill will be revised and re-submitted to Ecology to adjust the total design capacity of the combined landfills to be under 2.5 megagrams.

Ch. 173-460 WAC – Controls for New Sources of Toxic Air Pollutants	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	Installation of the closure system triggers new source review, application of best available control technology for toxics (T-BACT) and control of ambient air quality impacts.
Ch. 70.95 RCW – Solid Waste Management		
Ch. 173-351 WAC – Criteria for Municipal Solid Waste Landfills	Remedial actions conducted pursuant to an Agreed Order are exempt from procedural requirements.	<p>Closure and post-closure maintenance of cover system must conform to substantive requirements of Ch. 173-351 WAC.</p> <p>Local health department may participate in negotiations and review and comment upon any reports submitted to Ecology WAC 173-351-460; Ecology shall perform as described in Ch. 70.105D RCW and Ch. 173-340 WAC, WAC 173-351-465.</p> <p>Grant County must continue compliance with the solid waste handling permit issued by Grant County Health District for the facility except for activities directly addressed in the Agreed Order. See WAC 173-351-460.</p>